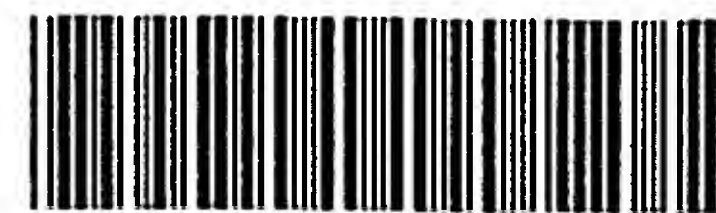


RAW SEQUENCE LISTING

The Biotechnology Systems Branch of the Scientific and Technical Information Center (STIC) no errors detected.

Application Serial Number: 10/566,573
Source: IFWP
Date Processed by STIC: 2/7/06

ENTERED



IFWP

RAW SEQUENCE LISTING

DATE: 02/07/2006

PATENT APPLICATION: US/10/566,573

TIME: 14:14:58

Input Set : A:\Sequence Listing ASCII, Docket No. 2144.0330000.St25.txt

Output Set: N:\CRF4\02072006\J566573.raw

3 <110> APPLICANT: GENEFIELD, INC.
 5 <120> TITLE OF INVENTION: METHODS OF SCREENING FOR USEFUL PROTEINS (as amended)
 7 <130> FILE REFERENCE: 2144.0330000
 C--> 9 <140> CURRENT APPLICATION NUMBER: US/10/566,573
 C--> 9 <141> CURRENT FILING DATE: 2006-01-31
 9 <150> PRIOR APPLICATION NUMBER: JP 2003-205139
 10 <151> PRIOR FILING DATE: 2003-07-31
 12 <150> PRIOR APPLICATION NUMBER: JP 2003-416228
 13 <151> PRIOR FILING DATE: 2003-12-15
 15 <160> NUMBER OF SEQ ID NOS: 56
 17 <170> SOFTWARE: PatentIn version 3.1
 19 <210> SEQ ID NO: 1
 20 <211> LENGTH: 55
 21 <212> TYPE: DNA
 22 <213> ORGANISM: Artificial
 24 <220> FEATURE:
 25 <223> OTHER INFORMATION: an artificially synthesized sequence
 27 <220> FEATURE:
 28 <221> NAME/KEY: modified_base
 29 <222> LOCATION: (20)..(20)
 30 <223> OTHER INFORMATION: Biotin is bonded to the 20th cytosine.
 32 <400> SEQUENCE: 1
 33 cccggtgcag ctgtttcatc cggaaacagc tgcaccccc gccgcccccc gtcct 55
 36 <210> SEQ ID NO: 2
 37 <211> LENGTH: 36
 38 <212> TYPE: PRT
 39 <213> ORGANISM: Artificial
 41 <220> FEATURE:
 42 <223> OTHER INFORMATION: an artificially synthesized sequence
 44 <220> FEATURE:
 45 <221> NAME/KEY: MISC_FEATURE
 46 <222> LOCATION: (1)..(4)
 47 <223> OTHER INFORMATION: "Xaa" = any amino acids.
 49 <220> FEATURE:
 50 <221> NAME/KEY: MISC_FEATURE
 51 <222> LOCATION: (6)..(8)
 52 <223> OTHER INFORMATION: "Xaa" = any amino acids.
 54 <220> FEATURE:
 55 <221> NAME/KEY: MISC_FEATURE
 56 <222> LOCATION: (10)..(12)
 57 <223> OTHER INFORMATION: "Xaa" = any amino acids.
 59 <220> FEATURE:
 60 <221> NAME/KEY: MISC_FEATURE

RAW SEQUENCE LISTING

DATE: 02/07/2006

PATENT APPLICATION: US/10/566,573

TIME: 14:14:58

Input Set : A:\Sequence Listing ASCII, Docket No. 2144.0330000.St25.txt

Output Set: N:\CRF4\02072006\J566573.raw

```

61 <222> LOCATION: (14)..(17)
62 <223> OTHER INFORMATION: "Xaa" = any amino acids.
64 <220> FEATURE:
65 <221> NAME/KEY: MISC_FEATURE
66 <222> LOCATION: (19)..(22)
67 <223> OTHER INFORMATION: "Xaa" = any amino acids.
69 <220> FEATURE:
70 <221> NAME/KEY: MISC_FEATURE
71 <222> LOCATION: (24)..(31)
72 <223> OTHER INFORMATION: "Xaa" = any amino acids.
74 <220> FEATURE:
75 <221> NAME/KEY: MISC_FEATURE
76 <222> LOCATION: (33)..(36)
77 <223> OTHER INFORMATION: "Xaa" = any amino acids.
79 <400> SEQUENCE: 2
W--> 80 Xaa Xaa Xaa Xaa Cys Xaa Xaa Xaa Cys Xaa Xaa Xaa Cys Xaa Xaa Xaa
      81 1           5           10           15
W--> 83 Xaa Cys Xaa Xaa Xaa Xaa Cys Xaa Xaa Xaa Xaa Xaa Xaa Xaa Xaa Xaa Cys
      84           20           25           30
W--> 86 Xaa Xaa Xaa Xaa
      87           35
90 <210> SEQ ID NO: 3
91 <211> LENGTH: 36
92 <212> TYPE: PRT
93 <213> ORGANISM: Artificial
95 <220> FEATURE:
96 <223> OTHER INFORMATION: an artificially synthesized sequence
98 <220> FEATURE:
99 <221> NAME/KEY: MISC_FEATURE
100 <222> LOCATION: (1)..(2)
101 <223> OTHER INFORMATION: "Xaa" = any amino acids.
103 <220> FEATURE:
104 <221> NAME/KEY: MISC_FEATURE
105 <222> LOCATION: (4)..(12)
106 <223> OTHER INFORMATION: "Xaa" = any amino acids.
108 <220> FEATURE:
109 <221> NAME/KEY: MISC_FEATURE
110 <222> LOCATION: (14)..(15)
111 <223> OTHER INFORMATION: "Xaa" = any amino acids.
113 <220> FEATURE:
114 <221> NAME/KEY: MISC_FEATURE
115 <222> LOCATION: (17)..(21)
116 <223> OTHER INFORMATION: "Xaa" = any amino acids.
118 <220> FEATURE:
119 <221> NAME/KEY: MISC_FEATURE
120 <222> LOCATION: (23)..(27)
121 <223> OTHER INFORMATION: "Xaa" = any amino acids.
123 <220> FEATURE:
124 <221> NAME/KEY: MISC_FEATURE

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RAW SEQUENCE LISTING

DATE: 02/07/2006

PATENT APPLICATION: US/10/566,573

TIME: 14:14:58

Input Set : A:\Sequence Listing ASCII, Docket No. 2144.0330000.St25.txt

Output Set: N:\CRF4\02072006\J566573.raw

```

125 <222> LOCATION: (29)..(31)
126 <223> OTHER INFORMATION: "Xaa" = any amino acids.
128 <220> FEATURE:
129 <221> NAME/KEY: MISC_FEATURE
130 <222> LOCATION: (33)..(36)
131 <223> OTHER INFORMATION: "Xaa" = any amino acids.
133 <400> SEQUENCE: 3
W--> 134 Xaa Xaa Cys Xaa Xaa Xaa Xaa Xaa Xaa Xaa Xaa Xaa Cys Xaa Xaa Cys
      135 1          5          10          15
W--> 137 Xaa Xaa Xaa Xaa Xaa Cys Xaa Xaa Xaa Xaa Xaa Cys Xaa Xaa Xaa Cys
      138          20          25          30
W--> 140 Xaa Xaa Xaa Xaa
      141          35
144 <210> SEQ ID NO: 4
145 <211> LENGTH: 215
146 <212> TYPE: DNA
147 <213> ORGANISM: Artificial
149 <220> FEATURE:
150 <223> OTHER INFORMATION: an artificially synthesized sequence
152 <220> FEATURE:
153 <221> NAME/KEY: misc_feature
154 <222> LOCATION: (71)..(82)
155 <223> OTHER INFORMATION: "n" = a, t, g, or c.
157 <220> FEATURE:
158 <221> NAME/KEY: misc_feature
159 <222> LOCATION: (86)..(109)
160 <223> OTHER INFORMATION: "n" = a, t, g, or c.
162 <220> FEATURE:
163 <221> NAME/KEY: misc_feature
164 <222> LOCATION: (113)..(124)
165 <223> OTHER INFORMATION: "n" = a, t, g, or c.
167 <220> FEATURE:
168 <221> NAME/KEY: misc_feature
169 <222> LOCATION: (128)..(139)
170 <223> OTHER INFORMATION: "n" = a, t, g, or c.
172 <220> FEATURE:
173 <221> NAME/KEY: misc_feature
174 <222> LOCATION: (143)..(151)
175 <223> OTHER INFORMATION: "n" = a, t, g, or c.
177 <220> FEATURE:
178 <221> NAME/KEY: misc_feature
179 <222> LOCATION: (155)..(163)
180 <223> OTHER INFORMATION: "n" = a, t, g, or c.
182 <220> FEATURE:
183 <221> NAME/KEY: misc_feature
184 <222> LOCATION: (167)..(178)
185 <223> OTHER INFORMATION: "n" = a, t, g, or c.
187 <400> SEQUENCE: 4
188 tttccccgcc ccccgctcctg cttccgccgt gatgatgatg atgatggcct ccgcttggag 60

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RAW SEQUENCE LISTING

DATE: 02/07/2006

PATENT APPLICATION: US/10/566,573

TIME: 14:14:58

Input Set : A:\Sequence Listing ASCII, Docket No. 2144.0330000.St25.txt

Output Set: N:\CRF4\02072006\J566573.raw

```

W--> 190 ggccggaggg nnnnnnnnnn nnacannnnn nnnnnnnnnn nnnnnnnna cannnnnnnn 120
W--> 192 nnnnacannn nnnnnnnnnna cannnnnnnn nacannnnnn nnnacannnn nnnnnnnnca 180
194 tgggtggcttg tagttgtaga atgtaaaatg taatg 215
197 <210> SEQ ID NO: 5
198 <211> LENGTH: 215
199 <212> TYPE: DNA
200 <213> ORGANISM: Artificial
202 <220> FEATURE:
203 <223> OTHER INFORMATION: an artificially synthesized sequence
205 <220> FEATURE:
206 <221> NAME/KEY: misc_feature
207 <222> LOCATION: (38)..(43)
208 <223> OTHER INFORMATION: "n" = a, t, g, or c.
210 <220> FEATURE:
211 <221> NAME/KEY: misc_feature
212 <222> LOCATION: (47)..(73)
213 <223> OTHER INFORMATION: "n" = a, t, g, or c.
215 <220> FEATURE:
216 <221> NAME/KEY: misc_feature
217 <222> LOCATION: (77)..(82)
218 <223> OTHER INFORMATION: "n" = a, t, g, or c.
220 <220> FEATURE:
221 <221> NAME/KEY: misc_feature
222 <222> LOCATION: (86)..(100)
223 <223> OTHER INFORMATION: "n" = a, t, g, or c.
225 <220> FEATURE:
226 <221> NAME/KEY: misc_feature
227 <222> LOCATION: (104)..(118)
228 <223> OTHER INFORMATION: "n" = a, t, g, or c.
230 <220> FEATURE:
231 <221> NAME/KEY: misc_feature
232 <222> LOCATION: (122)..(130)
233 <223> OTHER INFORMATION: "n" = a, t, g, or c.
235 <220> FEATURE:
236 <221> NAME/KEY: misc_feature
237 <222> LOCATION: (134)..(145)
238 <223> OTHER INFORMATION: "n" = a, t, g, or c.
240 <400> SEQUENCE: 5
W--> 241 catggtggct tgtagttgta gaatgtaaaa tgtaatgnnn nnntgtnnnn nnnnnnnnnn 60
W--> 243 nnnnnnnnnn nnntgtnnnn nntgtnnnnn nnnnnnnnnn tgtnnnnnnn nnnnnnnntg 120
W--> 245 tnnnnnnnnn tgtnnnnnnn nnnnnccctc cgccctcca agcggaggcc atcatcatca 180
247 tcatcacggc ggaagcagga cggggggcgg ggaaa 215
250 <210> SEQ ID NO: 6
251 <211> LENGTH: 37
252 <212> TYPE: DNA
253 <213> ORGANISM: Artificial
255 <220> FEATURE:
256 <223> OTHER INFORMATION: an artificially synthesized primer sequence
258 <400> SEQUENCE: 6

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RAW SEQUENCE LISTING

DATE: 02/07/2006

PATENT APPLICATION: US/10/566,573

TIME: 14:14:58

Input Set : A:\Sequence Listing ASCII, Docket No. 2144.0330000.St25.txt

Output Set: N:\CRF4\02072006\J566573.raw

```

259 cattacattt tacattctac aactacaagc caccatg 37
262 <210> SEQ ID NO: 7
263 <211> LENGTH: 19
264 <212> TYPE: DNA
265 <213> ORGANISM: Artificial
267 <220> FEATURE:
268 <223> OTHER INFORMATION: an artificially synthesized primer sequence
270 <400> SEQUENCE: 7
271 tttccccgcc ccccgctcct 19
274 <210> SEQ ID NO: 8
275 <211> LENGTH: 117
276 <212> TYPE: DNA
277 <213> ORGANISM: Artificial
279 <220> FEATURE:
280 <223> OTHER INFORMATION: an artificially synthesized primer sequence
282 <400> SEQUENCE: 8
283 gatcccgcca aattaatacg actcactata ggggaagtat ttttacaaca attaccaaca 60
285 acaacaacaa acaacaacaa cattacattt tacattctac aactacaagc caccatg 117
288 <210> SEQ ID NO: 9
289 <211> LENGTH: 19
290 <212> TYPE: DNA
291 <213> ORGANISM: Artificial
293 <220> FEATURE:
294 <223> OTHER INFORMATION: an artificially synthesized primer sequence
296 <400> SEQUENCE: 9
297 aggacggggg gcggggaaa 19
300 <210> SEQ ID NO: 10
301 <211> LENGTH: 40
302 <212> TYPE: DNA
303 <213> ORGANISM: Artificial
305 <220> FEATURE:
306 <223> OTHER INFORMATION: an artificially synthesized primer sequence
308 <400> SEQUENCE: 10
309 caacaacatt acattttaca ttctacaact acaagccacc 40
312 <210> SEQ ID NO: 11
313 <211> LENGTH: 19
314 <212> TYPE: DNA
315 <213> ORGANISM: Artificial
317 <220> FEATURE:
318 <223> OTHER INFORMATION: an artificially synthesized primer sequence
320 <400> SEQUENCE: 11
321 tttccccgcc ccccgctcct 19
324 <210> SEQ ID NO: 12
325 <211> LENGTH: 117
326 <212> TYPE: DNA
327 <213> ORGANISM: Artificial
329 <220> FEATURE:
330 <223> OTHER INFORMATION: an artificially synthesized sequence
332 <400> SEQUENCE: 12

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RAW SEQUENCE LISTING ERROR SUMMARY
PATENT APPLICATION: US/10/566,573

DATE: 02/07/2006
 TIME: 14:14:59

Input Set : A:\Sequence Listing ASCII, Docket No. 2144.0330000.St25.txt
 Output Set: N:\CRF4\02072006\J566573.raw

Please Note:

Use of n and/or Xaa have been detected in the Sequence Listing. Please review the Sequence Listing to ensure that a corresponding explanation is presented in the <220> to <223> fields of each sequence which presents at least one n or Xaa.

Seq#:2; Xaa Pos. ~~1,2,3,4,6,7,8,10,11,12,14,15,16,17,19,20,21,22,24,25,26,27~~
 Seq#:2; Xaa Pos. ~~28,29,30,31,33,34,35,36~~
 Seq#:3; Xaa Pos. ~~1,2,4,5,6,7,8,9,10,11,12,14,15,17,18,19,20,21,23,24,25,26~~
 Seq#:3; Xaa Pos. ~~27,29,30,31,33,34,35,36~~
 Seq#:4; N Pos. ~~71,72,73,74,75,76,77,78,79,80,81,82,86,87,88,89,90,91,92,93~~
 Seq#:4; N Pos. ~~94,95,96,97,98,99,100,101,102,103,104,105,106,107,108,109~~
 Seq#:4; N Pos. ~~113,114,115,116,117,118,119,120,121,122,123,124,128,129,130~~
 Seq#:4; N Pos. ~~131,132,133,134,135,136,137,138,139,143,144,145,146,147,148~~
 Seq#:4; N Pos. ~~149,150,151,155,156,157,158,159,160,161,162,163,167,168,169~~
 Seq#:4; N Pos. ~~170,171,172,173,174,175,176,177,178~~
 Seq#:5; N Pos. ~~38,39,40,41,42,43,47,48,49,50,51,52,53,54,55,56,57,58,59,60~~
 Seq#:5; N Pos. ~~61,62,63,64,65,66,67,68,69,70,71,72,73,77,78,79,80,81,82,86~~
 Seq#:5; N Pos. ~~87,88,89,90,91,92,93,94,95,96,97,98,99,100,104,105,106,107~~
 Seq#:5; N Pos. ~~108,109,110,111,112,113,114,115,116,117,118,122,123,124,125~~
 Seq#:5; N Pos. ~~126,127,128,129,130,134,135,136,137,138,139,140,141,142,143~~
 Seq#:5; N Pos. ~~144,145~~
 Seq#:13; N Pos. 33,34,35,36,37,38,39,40,41,42,43,44,45,46,47,48,49,50,51,52
 Seq#:13; N Pos. 53,54,55,56,57,58,59,60,61,62,63,64,65,66,67,68,69,70,71,72
 Seq#:13; N Pos. 73,74,75,76,77,78,79,80,81,82,83,84,85,86,87,88,89
 Seq#:15; N Pos. 124,125,126,127,128,129,130,131,132,133,134,135,136,137,138
 Seq#:15; N Pos. 139,140,141,142,143,144,145,146,147,148,149,150,151,152,153
 Seq#:15; N Pos. 154,155,156,157,158,159,160,161,162,163,164,165,166,167,168
 Seq#:15; N Pos. 169,170,171,172,173,174,175,176,177,178,179,180
 Seq#:29; Xaa Pos. 19
 Seq#:47; Xaa Pos. 31
 Seq#:48; Xaa Pos. 31

Invalid Line Length:

The rules require that a line not exceed 72 characters in length. This includes spaces.

Seq#:54; Line(s) 1013,1018
 Seq#:55; Line(s) 1039,1044
 Seq#:56; Line(s) 1065,1070

Invalid <213> Response:

Use of "Artificial" only as "<213> Organism" response is incomplete, per 1.823(b) of New Sequence Rules. Valid response is Artificial Sequence.

Seq#:1,2,3,4,5,6,7,8,9,10,11,12,13,14,15,16,17,18,19,20,21,22,23,24,25,26,27
 Seq#:28,29,30,31,32,33,34,35,36,37,38,39,40,41,42,43,44,45,46,47,48,49,50,51
 Seq#:52,53,54,55,56

VERIFICATION SUMMARY

DATE: 02/07/2006

PATENT APPLICATION: US/10/566,573

TIME: 14:14:59

Input Set : A:\Sequence Listing ASCII, Docket No. 2144.0330000.St25.txt

Output Set: N:\CRF4\02072006\J566573.raw

L:9 M:270 C: Current Application Number differs, Replaced Current Application No

L:9 M:271 C: Current Filing Date differs, Replaced Current Filing Date

L:80 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:2 after pos.:0

L:83 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:2 after pos.:16

L:86 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:2 after pos.:32

L:134 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:3 after pos.:0

L:137 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:3 after pos.:16

L:140 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:3 after pos.:32

L:190 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:4 after pos.:60

L:192 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:4 after pos.:120

L:241 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:5 after pos.:0

L:243 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:5 after pos.:60

L:245 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:5 after pos.:120

L:355 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:13 after pos.:0

L:357 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:13 after pos.:60

L:395 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:15 after pos.:120

L:619 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:29 after pos.:16

L:909 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:47 after pos.:16

L:930 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:48 after pos.:16